INDEX

A

ABDOMEN, upper, operation on, under spinal anæsthesia, reliability of heavy and light solutions compared 11
Abdominal operations, deflation of lower lobes of lungs in cases of... 91
—— —— post-operative pain after local anæsthesia for (W. Capelle and E. Fule: abstract) 127
—— —— severe, safety of local anæsthetics in 78
—— —— upper and lower; post-operative complications following, at Royal Victoria Hospital, Folkestone 95, 96, 97
Abstracts 30, 72, 126, 163
Acetonuria, following pulmonary over-ventilation 115
Acidæmia, causes of 116
—— effect on respiration 116
Acidosis, prevention and treatment by glucose 133
—— and ketonuria, post-operative, investigations of (F. Rocher: abstract) 128
Action currents in single fibres of the vagus 120
Adrenalin, administration with avertin contra-indicated 15
Adrian, action currents in single fibres of the vagus 120
Alcoholic solutions, rate of ascent in mock spinal analgesia 52
Alkalæmia, causes of 116
—— effect on respiration 116
Alveoli, pulmonary, collapse of, cause 89
Amınonia, coefficient rise in, caused by anæsthesia 133
Anæsthesia, advances in practice of, in India 122
—— fatalities associated with, how to reduce (editorial) 87, 88
—— for confinements, controversy regarding 80
—— general and basal, combined, good effects of 21
—— —— and regional, mortality under compared, in cases of post-operative pulmonary complications, at Royal Victoria Hospital, Folkestone 100, 101
—— human heart in (T. G. W. Hill: abstract) 127
—— in child-birth 85
—— in gynæcology (H. P. Fairlie) 82
—— methods used in cases of post-operative pulmonary complications 94, 95
—— Section of (Victoria Branch, British Medical Association), date of foundation 64
—— subcutaneous, origin of 153
—— unexpected fatalities after 77
—— —— cause of 78, 79
Anæsthetic, deaths due to 77, 78

Anæsthetic, deaths due to, how explained 78
—— fatalities, lost opportunities for diminution of, under present system of coroner's inquests 80
—— —— made subject of enquiry in Australian teaching hospitals ...64
—— services, question of payment for 85
Anæsthetics, administration by unqualified persons, resolution regarding 85
—— causing rise in ammonia co-efficient 133
—— Committee, Medical Research Council and Royal Society of Medicine, report on the clinical value of "evipan" 23
—— Diploma in, question of 85
—— local, safety of in severe abdominal operations 78
—— Section of (Royal Society of Medicine: "Anæsthesia in gynæcology" (H. P. Fairlie) 82
—— —— Intra-thecal nerve-root block (W. Etherington-Wilson) 43, 83
—— —— —— —— Discussion on modern views on respiration: respiratory failure (Alan Moncrieff) 125
—— suitable for midwifery 1
Anæsthetists and coroners, difficulties in relationship between 79, 80, 157, 158
—— Australian, organization of 64
—— —— training of 57
—— dissatisfaction at procedure of coroner's inquests 79, 80, 157, 158
—— honorary, status of, in two Australian teaching hospitals.....56
Analgesia, self-administered, for midwifery of general practice (R. J. Minnitt) 148, 162
—— —— —— —— apparatus for described 149
—— —— —— —— hospitals in which first tried out 151
—— —— —— —— results 151
—— —— —— —— results of electro-cardiographic tracings taken during and after 150
—— —— —— —— technique of 149, 150
—— special definition of 148
Analgesics in midwifery 122, 123
Anschütz, Prof., mortality statistics of avertin 141, 142
Aortic arch, control of pulmonary ventilation by 114
Apneustic breathing 110, 111
Apnœa, induction through pulmonary over-ventilation 115
Ashworth, H. K.: Test for purity of avertin solution (abstract) 32
Association of Anæsthetists of Great Britain and Ireland, annual general meeting 84, 160
—— —— —— —— resolution regarding administration of anæsthetics by unqualified persons 85
Atelectasis as post-operative pulmonary complication 94
—— experimental production 93
Atropine, administration before chloroform anæsthesia in two Australian teaching hospitals 59

Atropine, increase in doses advocated to prevent excessive post-operative secretion of bronchial mucus 107
—— premedication with, influence on post-anæsthetic vomiting 136, 137
Aurett, L.: Nembutal and scopolamine analgesia in labour (abstract) 128
Australia, work of anæsthetists in 41
Australian anæsthetists, performances required of, in department of regional and spinal anæsthesia 63, 64
—— teaching hospitals, anæsthetic fatalities made subject of enquiry in 64
—— —— —— two, anæsthetic technique employed in (F. W. Green) 56
Avertin, administration of, adrenalin not to be given during 15
—— —— by rectal route 142, 143
—— —— cause of death under, discussed 18
—— —— fall of blood-pressure under 13
—— —— —— of pulse-rate and of blood-pressure under, case described 13, 14
—— —— variation of pulse-rate under 12, 13
—— anæsthesia (K. E. Madan) 20
—— —— fall of blood-pressure due to, how counteracted 21
—— —— —— —— under, with increase of pulse-rate 14, 15
—— —— favourable experience with 141
—— —— in obstetrics (C. Coghlan) 145
—— —— mortality statistics favourable 141, 142
—— —— objections to, enumerated and discussed 140–144
—— —— present position of (K. Maddox) 140
—— —— regaining of cough reflex under 143
—— —— untoward symptoms accompanying or following 143
—— and ethylene-oxygen anæsthesia, death under, before operation for exophthalmic goitre (G. Brown) 16
—— attempt to secure complete anæsthesia by, dangerous 21
—— in treatment of convulsive states and tetanus 145
—— narcosis, coramin in high doses as awakener in (H. Dienz: abstract) 30
—— preparation of, method 144
—— solution of, purity of, test for (H. K. Ashworth: abstract) 32

B

Backer-Grondahl, N.: Researches into the alteration of the cerebro-spinal fluid after spinal anæsthesia (abstract) 126
Baker and Grodinsky: Clinical and experimental study of spinal anæsthesia (abstract) 31
Basal anæsthesia, variations in pulse-rate and blood-pressure during (A. P. Gorham) 12
—— narcosis in Australian teaching hospitals 60
Beard, J. W. and A. Blalock: Experimental shock (abstract) 33

Berry, Lady: Obituary 166
Blalock, A., and J. W. Beard: Experimental shock (abstract) 33
Blomfield, J., O.B.E,: Discussion on anæsthesia in gynæcology 83
—— favourable experience with avertin (quoted) 141
Blood-changes, absence under ethylene anæsthesia 67
—— plasma, influence of chloroform and ether on (L. Carmona: abstract) 33
—— pressure, arterial, changes in modifying respiration 113
—— —— effect of section of splanchnics upon 7
—— —— —— of spinal anæsthesia on 5, 6
—— —— effects of administration of evipan upon 25
—— —— fall of, accompanying avertin anæsthesia 5, 6, 143
—— —— —— dangerous, following administration of chloroform ...22
—— —— —— during operation 6, 8
—— —— —— —— causes discussed 8, 9
—— —— —— following administration of avertin, how counteracted 21
—— —— —— produced experimentally 9
—— —— —— treatment in dangerous cases 9
—— —— —— under administration of avertin 13
—— —— —— with increase of pulse-rate under avertin anæsthesia 14, 15
—— —— nature of, discussed 7
—— —— rise and fall of, respective effects on respiration 119
—— —— variation in during basal anæsthesia (A. P. Gorham) 12
—— —— —— —— percentage of occurrence 12
—— —— and pulse-rate, fall of under administration of avertin, case described 13, 14
—— reaction of, variation of pulmonary ventilation with 113
—— retention of carbon dioxide in, how caused 115
Body metabolism, upset of, as cause of unexpected fatalities after anæsthesia 78, 79
—— temperature, regulation difficult under warm surroundings.....113
Bonner, R. W.: Ether and chloroform narcosis as a treatment for cancer (abstract) 127
Bonnite, influence on post-anæsthetic vomiting 136
Boyd, James Paton: Obituary 39
Boyle-Davis gag 61
Brain, surgery of, nitrous-oxide oxygen in (K. C. McCarthy, E. I. McKesson, and F. S. Clement: abstract) 164
Breathing. *See* Respiration
Briscoe, Sir J. Charlton: Cause of collapse of lungs 91
—— —— prophylaxis of post-operative pulmonary complications...107
Bronchioles, excretion of mucus in, as essential factor in causation of post-operative pulmonary complications 105
Bronchitis as post-operative pulmonary complication 101, 102
—— —— —— —— case records 102
Broncho-pneumonia as post-operative pulmonary complication 101, 102

Brown, Gilbert: A death under anæsthesia 16
Brumbaugh: Absence of blood changes under ethylene anæsthesia ...67
Byrom, Dr.: Analyses of sex incidence of post-operative pulmonary complications 99
—— treatment of post-operative pulmonary complications 107

C

Cæsarean section, spinal anæsthesia in (K. M. Heard: abstract) 34
Canada: Questionnaire regarding use of ethylene issued to anæsthetists of 66
Cancer, ether and chloroform narcosis as treatment for (R. W. Bonner: abstract) 127
Capelle, W., and Fule, E.: Local anæsthesia for post-operative pain after abdominal operations (abstract) 127
Carbon dioxide, administration of at end of ether anæsthesia, reason for 61
—— —— and oxygen, administration at end of operation, contra-indicated 107, 108
—— —— —— administration at end of operation in prevention of pulmonary complications 92, 107, 108
—— —— —— administration in disturbances following administration of avertin 15
—— method of elimination from body 112
—— mode of action of, on respiratory centre 115, 116
—— retention in blood, how caused 115
—— —— —— ill-effects of 115
—— small increase in inspired air, effect of 117
—— tension of blood, lowering by over-ventilation 115
Cardiovascular area, role of afferents from 121
Carmona, L.: *I compenenti del plasma nelle narcosi* (abstract) 33
Castallo, M. A.: Pernocton in obstetrics (abstract) 74
Casual comments: Unexpected fatalities after anæsthesia 77
—— —— Anæsthesia in India 122
—— —— Obstetrical analgesia, a warning 122
—— —— Cyclopropane 157
—— —— Coroners' inquests 157
Cerebro-spinal fluid, alteration of, after spinal anæsthesia, researches into (N. Backer-Grondahl: abstract) 126
—— —— leakage of, following laminectomy 48
—— —— —— in intrathecal nerve-root block 148
—— —— mock, preparation of 44
—— —— proper mixing of solution with in spinal analgesia 45
—— —— and percaine, mixing of, in spinal analgesia 49, 50
Chevillon, G., and Desplas, B.: Sodium soneryl as a basal narcotic (abstract) 75
Child-birth, anæsthesia in 85
Chloretone, influence on post-anæsthetic vomiting 136

Chloroform, administration of, followed by dangerous fall of blood-pressure 22
—— —— in Australian teaching hospitals 62
—— —— in midwifery, risk attending 1, 2
—— anæsthesia, deep, expiratory muscles not in action under, shown experimentally 111
—— "brisettes," use of in midwifery 29
—— capsules, administration of during labour (A. Rees: abstract)...32
—— —— distribution to midwives 85
—— —— Rivett's, for use in midwifery 80
—— influence on blood-plasma (L. Carmona: abstract) 33
—— narcosis as treatment for cancer (R. W. Bonner: abstract).....127
Chorea treated by evipan sodium (Gerald Slot and R. S. McDade: abstract) 75
Clement. F. S., McKesson, E. T., and McCarthy, K. C.: Nitrous-oxide oxygen in brain surgery (abstract) 164
Cocaine syncope, when occurring 18
Coghlan, Cecil: Avertin in obstetrics 145
Confinements. anæsthesia for, controversy regarding 80
Congo-red colour test 22
Copolamine, injection of in spinal analgesia 53
Coramine, administration in cardiac depression following administration of avertin 15
—— in high doses as awakener in avertin narcosis (H. Dienz: abstract) 30
—— in prevention of cyanosis accompanying avertin anæsthesia.....143
—— intramuscular injection in case of impending death under anæsthesia 17
Coroners and anæsthetists, difficulties in relationship between 79, 157, 158
Coroners' inquests, dissatisfaction of anæsthetists at proceedings 157, 158
—— —— lost opportunities for diminution of anæsthetic fatalities under present system of 80
Cough reflex regained under avertin anæsthesia 143
Cyanosis, absence under ethylene anæsthesia properly administered...67
—— accompanying avertin anæsthesia, prevention of 143
Cyclopropane 123
—— advantages of 123, 157
—— as anæsthetic agent (J. A. Stiles, W. B. Neff, E. A. Rovenstine and R. M. Waters: abstract). 163
—— expense of 157

D

De-etherization with oxygen and 10 per cent carbonic oxide, influence on post-anæsthetic vomiting 137
Desplas, B., and Chevillon, G.: Sodium soneryl as a basal narcotic (abstract) 75

Diarrhœa accompanied by acidæmia 116
Dienz, H.: Coramin in high doses as an awakener in avertin narcosis (abstract) 30
Diploma in Anæsthetics, question of 85
Diuresis following pulmonary over-ventilation 115
Divinyl ether 123
Doden, S. M.: External hysterographic studies of anæsthetic effects on parturient uterus (abstract) 75
Dura of spinal cord, anatomical relations of 48
Duracain light solution, administration of, for double herniotomy, death following recovery from anæsthetic 11

E

EDITORIALS: Anæsthetics for midwifery 1
—— Fatalities associated with anæsthesia 87
—— Provision of painless labour 131
—— Work of anæsthetists in Australia 41
Edwards, George: General intravenous anæsthesia with evipan-sodium, by Pasquale Serocca (Naples), translated by 153
Effort syndrome in patient with exophthalmic goitre, subsequently dying under anæsthesia 17
Electricity, static, causing ethylene explosions 69
Electro-cardiographic tracings taken during and after self-administered analgesia in midwifery 150
Elliott and Dingley: Collapse of lungs 90
—— —— treatment of post-operative pulmonary complications 107
Embolism, as ætiological factor in pulmonary complications 93, 94
—— as post-operative pulmonary complication 94
—— pulmonary, fatal, following operation, revealed post-mortem ... 77
Embolus, pulmonary 89
Endopharyngeal gas-anæsthesia in Australian teaching hospitals 63
—— method, administration of ether by, in Australian teaching hospitals 61
Endotracheal gas-anæsthesia in Australian teaching hospitals 63
—— method, administration of ether by, in Australian teaching hospitals 61, 62
Ephedrine, dose of, necessary to counteract fall of blood-pressure due to avertin 21
—— given hypodermically in treatment of circulatory disturbances following administration of avertin 15
—— injection of, in spinal analgesia 53, 55
Erect position, condition of auxiliary muscles of respiration in 91
—— and supine position, condition of abdominal muscles in, contrasted 91
Ether, administration, methods employed in Australian teaching hospitals 61

Ether anæsthesia, premedication employed in two Australian teaching hospitals 59
—— anæsthetic and spinal anæsthetic, relative merits of (H. L. Foss and L. J. Schwalm: abstract) 73
—— decomposition of (H. O. Nolan: abstract) 30
—— explosion with Roth-Dräger apparatus (Schmerz: abstract) ...163
—— influence of different brands of, on post-anæsthetic vomiting...135
—— —— on blood-plasma (L. Carmona: abstract) 33
—— inhalation from open mask, in depression of respiration following administration of avertin 15
—— —— provocative doses of 21
—— narcosis as treatment for cancer (R. W. Bonner: abstract).....127
—— open, administration, pioneer work of F. S. Rood in 37
—— present status of, in regard to impurities (W. B. Neff: abstract) 30
—— *See also* Divinyl ether
Etherington-Wilson, W.: Intra-thecal nerve-root block. Some contributions and a new technique. From a paper read before the Anæsthetic Section Royal Society of Medicine.....43
Ethyl chloride, influence on post-anæsthetic vomiting 135
Ethylene, administration, in Australian teaching hospitals 62, 63
—— —— —— —— operations for which reserved 63
—— —— —— separation from that of nitrous oxide 66
—— advantages of 67
—— anæsthesia, absence of blood-changes under 67
—— —— explosions under, deaths and injuries recorded.....70
—— —— properly administered, absence of cyanosis under 67
—— explosions 68, 69
—— —— due to static electricity 69
—— —— prevention of, method described 69, 70
—— oxygen anæsthesia. *See* Avertin and ethylene-oxygen
—— —— mixtures, inflammability of 68
—— present status of (I. C. Herb) 66
—— questionnaire regarding use of 66
Evipan, administration by the mouth 28
—— —— choice of subjects for 27
—— —— effects upon blood-pressure 25
—— —— followed by untoward symptoms 83
—— —— illustrative cases 27
—— —— intravenously 27
—— —— symptoms produced by 25, 26
—— —— technique 24
—— anæsthesia with (L. de Natale: abstract) 128
—— anæsthetic action of, duration 24, 26
—— clinical value of, report on 23
—— dosage 24, 25
—— evanescent action of 26

Evipan, experimental work with 23
—— isolation of 154
—— lethal dose of 23
—— use as preliminary anæsthetic 27
—— sodium, action of, characteristics 155, 156
—— —— chorea treated by (Gerald Slot and R. S. McDade: abstract) 75
—— —— experimental injection of 155
—— —— general intravenous anæsthesia with (P. Serocca) 153
Explosions under various kinds of gas-anæsthesia, deaths and injuries recorded 70

F

Fairlie, H. P.: Anæsthesia in gynæcology 82
Fatty tissue, extra-dural, seepage into, why not likely to occur....48
Featherstone, H. W.: Address at Annual Meeting, Association of Anæsthetists of Great Britain and Ireland 160
Finsterer, Prof.: Safety of local anæsthetics in severe abdominal operations 78
Foregger apparatus for gas anæsthesia 63
Foss and Cupp: Aetiology of pulmonary complications 93
Foss, H. L., and Schwalm, L. J.: Relative merits of spinal and ether anæsthesia (abstract) 73
Fule, E., and Capelle, W.: Local anæsthesia for post-operative pain after abdominal operations (abstract) 127

G

Galvanic currents, interrupted, experimental production of anæsthesia with 153
Gas anæsthesia, advantages of 67
—— —— explosions under various kinds of, deaths and injuries recorded 70
—— —— value of administration of oxygen with 67
—— —— *See also* Nitrous oxide
Gaseous anæsthetics, distribution by pipe-line system 62
—— —— patients to whom administered in Australian teaching hospitals 62
Gasping centre, site of, in brain 110
Gemmell, A. A.: Discussion on self-administered analgesia in midwifery 162
Glucose in prevention and treatment of acidosis 133
Goitre, exophthalmic, death before operation for, under avertin and ethylene-oxygen anæsthesia (G. Brown) 16
Gorham, A. P.: Variations in the pulse-rate and blood-pressure during basal anæsthesia, with description of a special case....12

Green, F. W., and Kaye, Geoffrey: Anæsthetic technique employed in two Australian teaching hospitals 56
Griffiths, R. H.: Post-operative pulmonary complications 89
Grodinsky and Baker: Clinical and experimental study of spinal anæsthesia (abstract) 31
Gynæcology, anæsthesia in 82

H

HEAD, Sir H.: Experiments regarding vagal afferent impulses 120
Headache during spinal analgesia, cause of 48, 49
—— following administration of percain 11
Heard, K. M.: Spinal anæsthesia in Cæsarean section (abstract) 34
Heart, human, in anæsthesia (I. G. W. Hill: abstract) 127
—— massage of, in case of impending death under anæsthesia 17
Herb, Isabella C.: The present status of ethylene 66
Herniotomy, double, death following recovery from spinal anæsthetic (light duracain) administered for 11
Hill, G. Falkner: Spinal anæsthesia, heavy solution or light 3
Hill, I. G. W.: Human heart in anæsthesia (abstract) 127
H-ion concentration of blood, changes in, effect on respiration.....116
Hospitals, Australian. *See* Australian
Hydrobromic acid, free, indication of 143
Hyperglycæmia following pulmonary over-ventilation 115
—— post-operative, causes of 133
Hyperpnœa, causes of 117
—— intense, due to small rise of carbon dioxide in inspired air.....117
Hyper-ventilation in prevention of post-operative pulmonary complications 92, 107, 108
Hypnotics and sedatives (A. R. Parsons: abstract) 73
Hypobaric solution, method of injection in spinal analgesia 51
—— —— rate of ascent in spinal analgesia, factors influencing.....50
Hysterographic studies (external) of anæsthetic effects on parturient uterus (S. M. Doden: abstract) 75

I

INDIA, advances in practice of anæsthesia in.....122
Inhalation anæsthesia in Australian teaching hospitals 60
Inquests on deaths after operation, sensational publicity given to, injurious (*see also* Coroners' inquests) 159
Insulin, administration at beginning and end of anæsthesia, effect of 133
—— —— before and after operation, influence on post-anæsthetic vomiting 138, 139
—— exhibition of, in connexion with administration of anæsthetics 133

Intervertebral space, third lumbar, safest for insertion of needle in spinal analgesia 45
Intestine, acute perforation of, fall of blood-pressure upon giving anæsthetic in 8
Intra-thecal nerve root block (W. Etherington-Wilson)....43
—— —— distances to be measured in performance of....47
—— —— requirements of 44
—— —— zones of 46

J

JARMAN, R. Discussion on anæsthesia in gynaecology....83
Jones and McClure: Transverse incision in prevention of pulmonary complications 94
—— —— treatment of post-operative pulmonary complications....106

K

KELLY, on spinal anæsthesia (quoted)....3
Kelly, Miss F. C., discussion on self-administered analgesia in midwifery 162
Ketonuria and acidosis, post-operative, investigations of (F. Roscher: abstract) 128
Kottlors, E. How are we to avoid the complications of spinal anæsthesia? (abstract) 34
Kroft and Taub: Isolation of evipan by 154

L

LABOUR, administration of chloroform capsules during (A. Rees: abstract) 32
—— nembutal and scopolamine analgesia in (L. Aurett: abstract) 128
—— painless, provision of (editorial) 131
—— relief of pain in, with nembutal (F. G. McGuinness: abstract) 126
—— sodium pentbarbital and scopolamin analgesia in (abstract)...165
Laminectomy, endotracheal administration of ether in operation for 62
—— leakage of cerebro-spinal fluid following....48
Lee (and others) on cause of post-operative pulmonary complications 92
Leucocytosis, following pulmonary over-ventilation 115
Lichtheim, cause of collapse of pulmonary alveoli....89
Liverpool Hospital for Women, records of post-operative vomiting kept at 134
—— Maternity Hospital, apparatus for self-administered analgesia in midwifery first tried out in....151, 152
Lumsden, on the respiratory centre 110

Lungs, collapse of, as ætiological factor in pulmonary complications 92
—— collapse of, causes of 89, 90
—— —— experimental 90, 91
—— —— types 90
—— consolidation of part of one or both, as post-operative pulmonary complication 103
—— —— case records 104
—— —— diagnosis 105
—— —— symptoms 103
—— deflation of lower lobes of, in cases of abdominal operations....91
—— expansion of, causes 90

M

McCarthy, K. C., McKesson, E. T., and Clement, F. S.: Nitrous oxide oxygen in brain surgery (abstract)....164
McDade, R. S., and Slot, Gerald: Chorea treated by evipan sodium (abstract) 75
McGuinness: Relief of pain in labour with nembutal (abstract) 126
McIlroy, Dame Louise: Discussion on self-administered analgesia in midwifery 162
McKesson, E. T., McCarthy, K. C., and Clement, F. S.: Nitrous oxide oxygen in brain surgery (abstract) 164
McKesson machine for administration of nitrous oxide gas and oxygen 63, 134
Madan, K. E.: Observations on avertin narcosis 20
Maddox, Kempton: The present position of avertin anæsthesia 140
Magill technique, employment in endotracheal anæsthesia 63
Medical students, instruction in administration of anæsthetics ...57, 58
Melbourne, teaching hospitals at, anæsthetic technique employed in...56
Mennell, Z.: Discussion on anæsthesia in gynæcology 83
Metabolism and pulmonary ventilation, connection between 112, 113
Midwifery, anæsthetics suitable for (editorial) 1
—— analgesics in 122, 123
—— of general practice, self-administered analgesia for (R. J. Minnitt) 148, 162
—— use of chloroform brisettes in 29
Midwives, distribution of chloroform capsules to 85
—— use of anæsthetics by, question as to 80, 81
Minnitt, R. J.: Apparatus for procuring prolonged analgesia with nitrous oxide and oxygen 85
—— exhibition of insulin in connection with administration of anæsthetics 133
—— self-administered analgesia for the midwifery of general practice 148, 162
Mock spinal analgesia. *See* Spinal analgesia, mock
Moncrieff, Alan: Respiratory failure 125

Monod: Action of evipan-sodium 155, 156
Morphia and nembutal, preliminary administration in gynæcological operations 82
Morphine, pre-medication with, influence on post-anæsthetic vomiting 136, 137
Mucus, bronchial, excessive secretion, post-operative, method of prevention 107
—— excretion in bronchioles, essential causative factor in production of post-operative pulmonary complications 105
Muscles, abdominal, condition of in supine and erect position contrasted 91
—— —— lack of contraction of predisposing to pulmonary collapse...91
—— expiratory, not in action under deep chloroform anæsthesia, shown experimentally 111
—— respiratory, auxiliary, condition of in erect and supine position...91

N

Natale, L. Di: Anæsthesia with evipan (abstract) 128
Needle, kind of, used for puncture in spinal analgesia 53
Neff, W. B.: Present status of ether regarding its impurities (abstract) 30
—— Stiles, J. A., Rovenstine, E. A., and Waters, R. M.: Cyclopropane as an anæsthetic agent (abstract) 163
Nembutal, oral administration of (F. F. Waddy: abstract) 31
—— pain in labour relieved with (F. G. McGuinness: abstract) 126
—— and scopolamine analgesia in labour (L. Aurett: abstract) 128
—— *See also* Morphia and nembutal
Nephrectomy, endotracheal administration of ether in operations for 62
Nitrous oxide, administration in Australian teaching hospitals 62, 63
—— —— —— operations for which reserved 63
—— —— administration of, separation from that of ethylene 66
—— —— and ethylene anæsthesia, explosions under, deaths and injuries recorded 70
—— —— and oxygen, apparatus for procuring prolonged analgesia with (R. J. Minnitt) 85
—— —— and oxygen in brain surgery (K. C. McCarthy, E. T. McKesson, and F. S. Clement: abstract) 164
—— —— gas and air, use of in self-administered analgesia for midwifery 149, 150
—— —— gas and oxygen, administration by McKesson machine ...134
—— —— —— anæsthesia employed in obstetrics 148
—— —— oxygen-ether anæsthesia, explosions under, deaths and injuries recorded 70, 71
Nolan, H. O.: Decomposition of anæsthetic ether (abstract) 30
Novocain, only way in which fatal 5
—— gliadin mixture, heavy solution, safety and reliability of 4
—— —— —— heavy and light solutions compared 4

O

OBITUARY: Lady Berry 166
James Paton Boyd 39
Llewellyn Powell 130
Felix S. Rood 36
Obstetrics, avertin anæsthesia in (C. Coghlan) 145
—— nitrous oxide gas and oxygen employed in 148
—— pernocton in (M. A. Castallo: abstract) 74
Omnopon, pre-medication with, influence on post-anæsthetic vomiting 136, 137
Operating table in spinal analgesia 53
Oxygen, administration of, influence on post-anæsthetic vomiting...138
—— —— with gas anæsthesia, value of 67
—— and 10 per cent carbonic oxide, de-etherization with, influence on post-anæsthetic vomiting 137
—— lack of, effects of, complex 117, 118
—— —— gradual, mode of dealing with 118
—— —— mode of action of 118, 119
—— —— response of respiration to 113
—— pure, inhalation of, no effect on respiration 117

P

PAIN, post-operative, after abdominal operations, local anæsthesia for (W. Capelle and E. Fule: abstract) 127
Pannett, Prof.: Cause of fall of blood-pressure produced experimentally 9
Paraldehyde, rectal, administration of in Australian hospitals 60
Parsons, A. R.: Hypnotics and sedatives (abstract) 74
Parsons, E. B.: Pulse-rate under administration of avertin (quoted) 13
Pasteur, W.: Massive collapse of lungs (quoted) 89, 90
Percaine, administration of, followed by headache 11
—— dosage of, in spinal analgesia 54, 55
—— effect of temperature on rise of, in mock spinal analgesia...51, 52
—— level to which ascending in spinal analgesia 49
—— rate of ascent of, in spinal glass canal and human spinal canal the same 47
—— solution of, in spinal analgesia, temperature should approximate that of patient 52
—— under spinal anæsthesia in intra-abdominal pelvic surgery....82
—— and cerebro-spinal fluid, mixing of, in mock spinal analgesia 49, 50
Pernocton in obstetrics (M. A. Castallo: abstract) 74
Pitkin: View as to effect of spinal anæsthesia on blood-pressure....6
Pitressin, intramuscular injection of, benefit from in grave cases of fall of blood-pressure 9

Planocaine in gynæcological operations 82
Post-operative hypoglycæmia 133
—— vomiting (G. F. Rawdon Smith) 132
—— —— *See also* Pulmonary complications, post-operative
Powell, Llewelyn: Obituary 130
Premedication before anæsthesia in Australian teaching hospitals 59, 60
—— employed in cases of post-operative pulmonary complications 95
Prize essay offered by Editorial Board of *British Journal of Anæsthesia* 42
Pulmonary afferent nerves in the vagi, controlling rhythm of respiration 114
—— complications post-operative (H. G. Griffiths) 89
—— —— causes of 92, 93
—— —— classification 94
—— —— essential factor in causation of 105
—— —— experimental production 93
—— —— following abdominal operations, at Royal Victoria Hospital, Folkestone 95, 96, 97
—— —— —— age and sex incidence 98, 99
—— —— —— nature of, tabulated 99, 100
—— —— methods of anæsthesia used in 95
—— —— premedication employed in cases of 95
—— —— prevention 92
—— —— —— by use of transverse incision 94
—— —— prophylaxis and treatment 106, 107, 108
—— —— references 109
—— —— seasonal incidence 106
—— —— sex incidence 105
—— ventilation, control of 114
—— —— excessive, ill-effects of 115
—— —— variation with, reaction of blood 113
—— —— and metabolism, connection between 112, 113
Pulse-rate, rise of, under surgical shock 12
—— variations in, during basal anæsthesia (A. P. Gorham) 12
—— —— percentage of occurrence 12
—— —— under administration of avertin 12, 13
—— and blood-pressure, fall of, under administration of avertin, case described 13, 14
—— —— treatment 15

R

Ravdin and Kern: Classification of pulmonary complications 94
Rectal anæsthesia, special field for 143
Rees, A.: Chloroform capsules during labour (abstract) 32
Resident medical officers, Australian, opportunities of giving anæsthetics 58

Respiration, depth of, mechanical regulation 111, 112
—— effect of changes in arterial blood-pressure on 113
—— —— changes in H-ion concentration of blood on 116
—— —— oxygen lack on 117
—— failure of (A. Moncrieff) 125
—— increased, effects of 7
—— inhalation of pure oxygen exercises no effect on 117
—— mechanism of, depressed in sleep 114
—— normal regulation of (references) 121
—— paralysis of, sole cause of death under novocain 5
—— purposes served by 112
—— response to oxygen lack 113
—— rhythm of, how controlled 114
—— role of vagi in 119
Respiratory centre, effect on other bulbar centres 121
—— —— experimental work relating to 110
—— —— loss of excitability 119
—— —— rhythmic activity of 111
—— depression caused by avertin 143
—— movements, connection of vagal afferent impulses with 120
Review: Technique of Local Anæsthesia, by A. G. Hertzler (5th ed.) 40
Rivett, L. C.: Discussion on self-administered analgesia in midwifery 162
Rivett's Chloroform Capsules, for use in midwifery 80
Rood, Felix S.: Advances in removal of tonsils by dissection, made by 37, 38
—— —— Obituary 36
—— —— value of open ether realized by 37
Roscher, F.: Investigations of post-operative acidosis and ketonuria (abstract) 128
Roth-Dräger apparatus, ether explosion with (abstract) 163
Rovenstine, E. A., Stiles, J. A., Neff, W. B., and Waters, R. M.: Cyclopropane as an anæsthetic agent (abstract) 163
Royal Victoria Hospital, Folkestone, post-operative pulmonary complications following abdominal operations at 95, 96, 97

S

Safety Gas-oxygen Machine 62, 63
Saline, administration of in grave disturbance following avertin anæsthesia 15
Schimmelbusch mask, ether administration with, in Australian teaching hospitals 61
Schüberth: Mortality statistics of avertin 141
Schwalm, L. J., and Foss, H. L.: Relative merits of spinal and ether anæsthesia (abstract) 73

Scopolamine analgesia and sodium pentbarbital in labour (abstract) 165
—— preliminary administration in spinal analgesia 54
Scott and Cutler: On post-operative pulmonary complications 92
—— —— treatment of post-operative pulmonary complications ...107
Sedatives and hypnotics (A. R. Parsons: abstract) 74
Seevers and Waters: Cause of fall of blood-pressure during operation 9, 10
Serocca, Pasquale: General intravenous anæsthesia with evipan sodium. Translated by George Edwards 153
Shields, H. J.: Spinal anæsthesia in thoracic surgery (abstract) ...72
Shipway, Sir F. E.: Favourable experience with avertin (quoted) 141
—— —— regaining of cough reflex under avertin anæsthesia 143
Shock, experimental (J. W. Beard and A. Blalock: abstract) 33
—— post-operative 77
—— —— fatalities wrongly ascribed to 77
—— surgical, raised pulse-rate under 12
Sino-aortic nerves 117
—— —— pulmonary ventilation controlled by 114
Sleep, respiratory mechanism depressed in 114
Slot, Gerald, and McDade, R. S.: Chorea treated by evipan-sodium (abstract) 74
Smith, G. F. Rawdon: Post-operative vomiting 132
Sodium amytal administered as sedative before anæsthesia in Australian teaching hospital 59
—— pentbarbital and scopolamine analgesia in labour (abstract)...165
—— soneryl as basal narcotic (B. Despas and G. Chevilton: abstract) 75
Specific gravity, effect on rate of ascent of hypobaric solution in spinal analgesia 52
Spinal anæsthesia, alteration of cerebro-spinal fluid after, researches into (N. Backer-Grondahl: abstract) 126
—— —— and ether anæsthesia, relative merits of (H. L. Foss and L. J. Schwalm: abstract) 73
—— —— clinical and experimental study of (Grodinsky and Baker: abstract) 31
—— —— complications of, methods of avoidance of (E. Kottlors: abstract) 34
—— —— effect upon blood-pressure 5, 6
—— —— experimental study of (K. W. Thompson: abstract) 164
—— —— heavy and light solutions in, compared (G. Falkner Hill) 3
—— —— —— mortality under, compared 10, 11
—— —— —— respective reliability 10
—— —— —— sequelæ compared 11
—— —— in Australian teaching hospitals 63
—— —— in Cæsarean section (K. M. Heard: abstract) 34
—— —— in thoracic surgery (H. J. Shields: abstract) 72

Spinal anæsthesia, post-operative pulmonary complications as frequent as under general anæsthesia, but operative mortality less 106
—— —— premedication before, in two Australian teaching hospitals 59, 60
—— —— with percaine in intra-abdominal surgery 82
—— anæsthetic (duracain) death following operation under and recovery from 11
—— analgesia, absorption of injected solution in, proof of rapidity of 48
—— —— actual technique in 53
—— —— apparatus used in 53
—— —— expertness in art of, difficult to acquire 43
—— —— headache during, cause of 48, 49
—— —— method of making injection in 54
—— —— mock, absorption of injected solution absent in 48
—— —— —— apparatus for 44
—— —— —— explanation of 43, 46
—— —— —— mixing experiments in 49, 50
—— —— —— types of experiments with 44
—— —— preparation of patient for 54
—— —— Trendelenburg position in 49, 53
—— —— vertical ascent method in, cases operated on, under 55
—— —— value of 78
—— canal, how divided into compartments 47
Splanchnics, section of, effect upon blood-pressure 7
Stiles, J. A., Neff, W. B., Rovenstine, E. A., and Waters, R. M.: Cyclopropane as an anæsthetic agent (abstract) 163
Stovaine glucose solution, effect of temperature on rise of, in mock spinal analgesia 51
Subcutaneous anæsthesia, origin of 153
Supine position, condition of auxiliary muscles of respiration in 91
—— and erect position, condition of abdominal muscles in, contrasted 91

T

TEMPERATURE, influence on rate of travel of solution in mock spinal analgesia 51, 52
Tetanus, treatment by avertin 145
Thompson, K. W.: Experimental study of spinal anæsthesia (abstract) 164
Thoracic surgery, spinal anæsthesia in (H. J. Shields: abstract) ...72
Thrombosis, coronary, fatal, following operation, revealed post-mortem 77
Tonsillectomy by dissection under endopharyngeal administration of ether 61
Tonsils, removal by dissection, pioneer work of F. S. Rood in 37, 38
Toxæmia, post-anæsthetic, prevention of 133

Transverse incision, in prevention of post-operative pulmonary complications 94
Trendelenburg position in gynæcological operations 82
—— —— in spinal analgesia 49, 53
Trolley, adjustable, use of, in spinal analgesia 53

U

United States: Questionnaire regarding ethylene issued to anæsthetists of 66
Universal Indicator 143
Unqualified persons, administration of anæsthetics by, resolution regarding 85
Urinary changes following pulmonary over-ventilation 115
Uterus, parturient, anæsthetic effects on, external hysterographic studies of (S. M. Doden: abstract) 75

V

Vagal afferent impulses, connection with respiratory movements... 120
Vagi, role of, in respiration 119
Vagus, action currents in single fibres of 120
Ventricle, left, diminished output of, in case of operation under avertin anæsthesia, with fall in pulse-rate and blood-pressure 14
Vertical position, rate of ascent of hypobaric solution in spinal anæsthesia 50, 51
Vesico-vaginal fistula, operation for, unexpected death following 78, 79
Vomiting, accompanied by acidæmia 116
—— post-operative (G. F. Rawdon Smith) 132
—— —— factors in causation of 133, 134
—— —— frequency under various anæsthetics compared 134, 135

W

Waddy, F. F.: Oral administration of nembutal (abstract) 31
Waters, R. M., Stiles, J. A., Neff, W. B., and Rovenstine, E. A.: Cyclopropane as an anæsthetic agent (abstract) 163
Weese: Study of effects of evipan-sodium 155
Wellhouse Hospital, Hertfordshire, apparatus for self-administered analgesia in midwifery, tried out in 151
Wright, Samson: Normal regulation of respiration 110
—— —— and Kremer effect of section of splanchnics upon blood-pressure 7